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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/723,830	11/28/2003	A. Harry J. Rajamannan	20031/AK	9282

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EXAMINER

GORMAN, DARREN W

ART UNIT

PAPER NUMBER

3752

DATE MAILED: 08/04/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/723,830

Applicant(s)

RAJAMANNAN, A. HARRY J.

Examiner

Darren W. Gorman

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-3 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-3 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 28 November 2003 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date ____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: ____.

DETAILED ACTION

Information Disclosure Statement

1. The listing of references in the specification is not a proper information disclosure statement. 37 CFR 1.98(b) requires a list of all patents, publications, or other information submitted for consideration by the Office, and MPEP § 609 A(1) states, "the list may not be incorporated into the specification but must be submitted in a separate paper." Therefore, unless the references have been cited by the examiner on form PTO-892, they have not been considered.

Drawings

2. The drawings are objected to because of the following informalities:
- Each individual drawing should be labeled as "Fig. 1" or "Figure 1" and "Fig. 2" or "Figure 2" in order to conform to description terminology used in the specification.
 - Applicant is further encouraged to label the drawings with reference characters corresponding to specific elements shown in the drawings and to properly amend the specification to include the reference characters used. See 37 CFR 1.84 (p-q)

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing

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should not be labeled as “amended.” If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either “Replacement Sheet” or “New Sheet” pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Minor Claim Suggestions By Examiner

3. The following change(s) are recommended to improve clarity of the claims. The claims have been examined on the merits including the suggested changes below.

In claim 2, on line 3, “Llauric” should be replaced with --Lauric--.

In claim 3, on line 2, “Fungii” should be replaced with --fungi--.

Specification

4. The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o). Correction of the following is required:

The specification as filed does not include disclosure with regard to killing or inhibiting the establishment of bacteria or virus as recited in claim 1. Further, the specific temperature

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range of 100-212 degrees Fahrenheit for defoliation and inhibiting of the establishment of fungi and bacteria as recited in claim 3 does not have proper antecedent basis in the specification.

Claim Rejections - 35 USC § 112

5. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter, which the applicant regards as his invention.

6. Claims 1-3 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 1-3 are narrative in form and replete with indefinite and functional or operational language. Essentially, the claims do not clearly and distinctly recite specific method steps of the process claimed.

Further, regarding claims 1 and 2, the phrase "such as" renders the claims indefinite because it is unclear whether the limitations following the phrase are part of the claimed invention. See MPEP § 2173.05(d).

The claims will be examined as best understood by the Examiner.

Claim Rejections - 35 USC § 103

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

8. Claim 1 is rejected under 35 U.S.C. 103(a) as being unpatentable over Newson et al., USPN 6,047,900, in view of Rajamannan, USPN 5,575,111.

Newson et al. teaches a method of killing unwanted vegetation using a rigid spray bar (15) having flexible hoses (20) attached thereto (see Figure 6). The expressly taught advantage of the flexible hoses (20) is that the nozzles may deflect when traversing ground where obstructions are present (see column 4, lines 23-25). However, Newson et al. teaches the use of hot steam or hot water for killing the unwanted vegetation, rather than using hot foam

Rajamannan teaches a method of using a traveling vehicle with a plurality of nozzles for applying hot foam to unwanted vegetation (weeds, etc.) (see column 2, lines 35-38; and column 3, lines 13-18) to kill and defoliate the unwanted vegetation, and to also kill insects, fungus and other undesirable pests harboring within the weeds (see column 2, lines 53-55; and column 3, lines 13-18). Rajamannan further teaches that using hot foam is advantageous over using hot water because hot water alone may not maintain an optimal temperature for a long enough period of time to melt the plant's protective wax coating, whereas the hot foam will "stick to the target and give intimate heat contact" for extended periods of time (see column 1, lines 56-65; and column 2, lines 45-52) without cooling down rapidly (see column 2, lines 35-38).

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the method of Newson et al., to apply hot foam, as taught by Rajamannan, since hot foam will stick to the unwanted vegetation better than hot water or steam and will not cool down as rapidly as water or steam, and the hot foam will further assist in killing other unwanted pests including but not limited to insects and fungus.

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9. Claims 2 and 3 are rejected under 35 U.S.C. 103(a) as being unpatentable over Newson et al. in view of Rajamannan, as applied to claim 1 above, and further in view of Rajamannan, USPN 5,622,123.

Newson et al. in view of Rajamannan ('111) teaches the method as recited in claim 1 and further teaches a hot foam temperature of approximately 212 degrees Fahrenheit (see column 2, line 28 of Rajamannan, '111), however at least one of the acids recited in claim 2 is not expressly taught to be added to the hot foam.

Rajamannan ('123) teaches a method for applying hot foam to soil using foaming agents, the foaming agents comprising any of several non-toxic and environmentally friendly fatty acids, which are known for producing "stable and effective foams" (see column 2, line 63 through column 3, line 2).

It would have been obvious to one having ordinary skill in the art at the time the invention was made to include any of the fatty acids taught by Rajamannan ('123) in the foaming agents used in the method taught by Newson et al. in view of Rajamannan ('111), in order to produce a stable and effective foam without adversely effecting the environment or endangering humans.

Conclusion

10. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. US Patents to Simpson, Kirkland, Snow, Butler, Fasnacht, Thompson, McKenry, Thomson et al, Gunter, and Nuss, are cited as of interest.

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11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Darren W. Gorman whose telephone number is 571-272-4901.

The examiner can normally be reached on M-F 7:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dave Scherbel can be reached on 571-272-4919. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Darren W Gorman
Examiner
Art Unit 3752

DWG 7/27/05
DWG
July 27, 2005



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